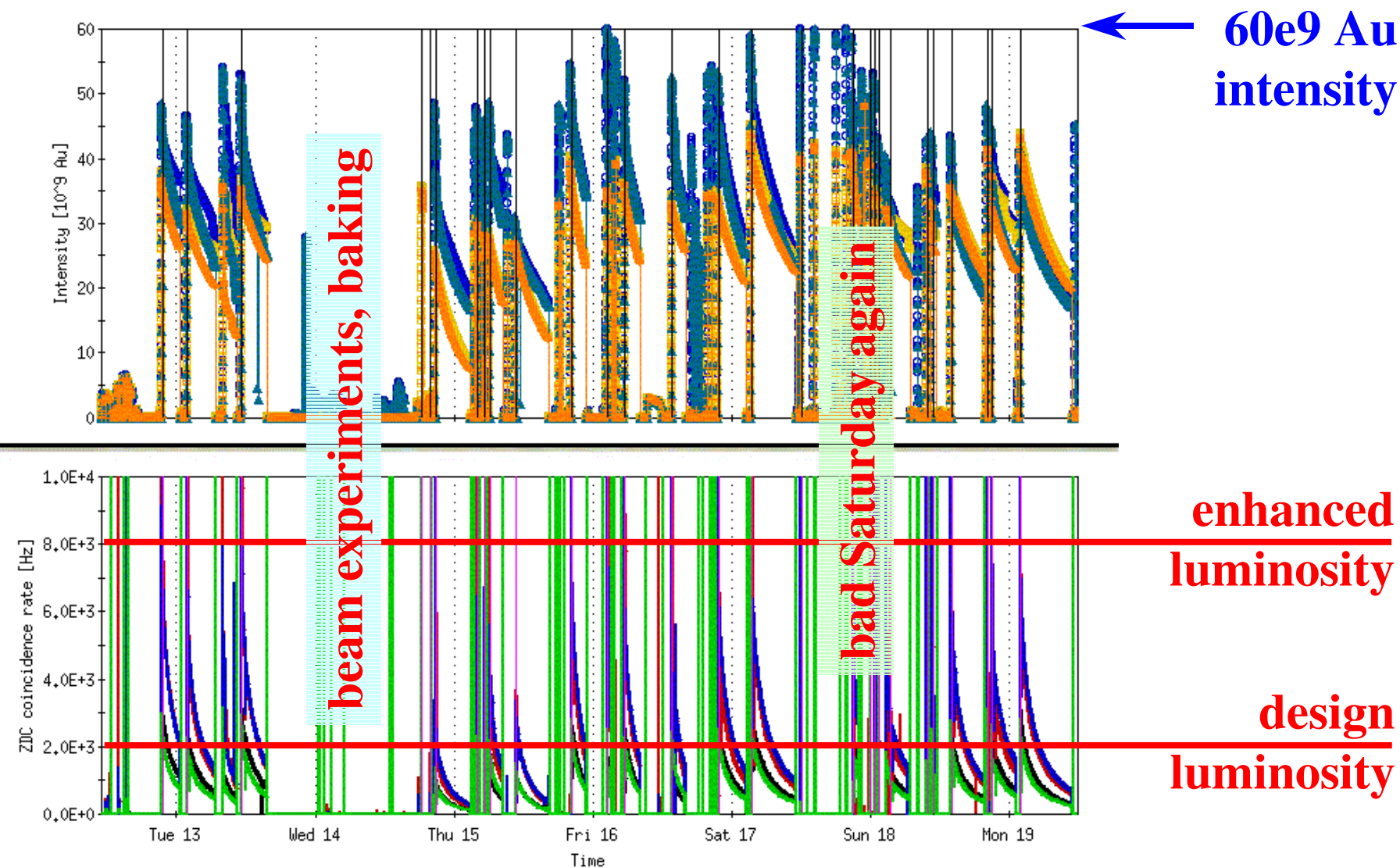


Progress during last week:

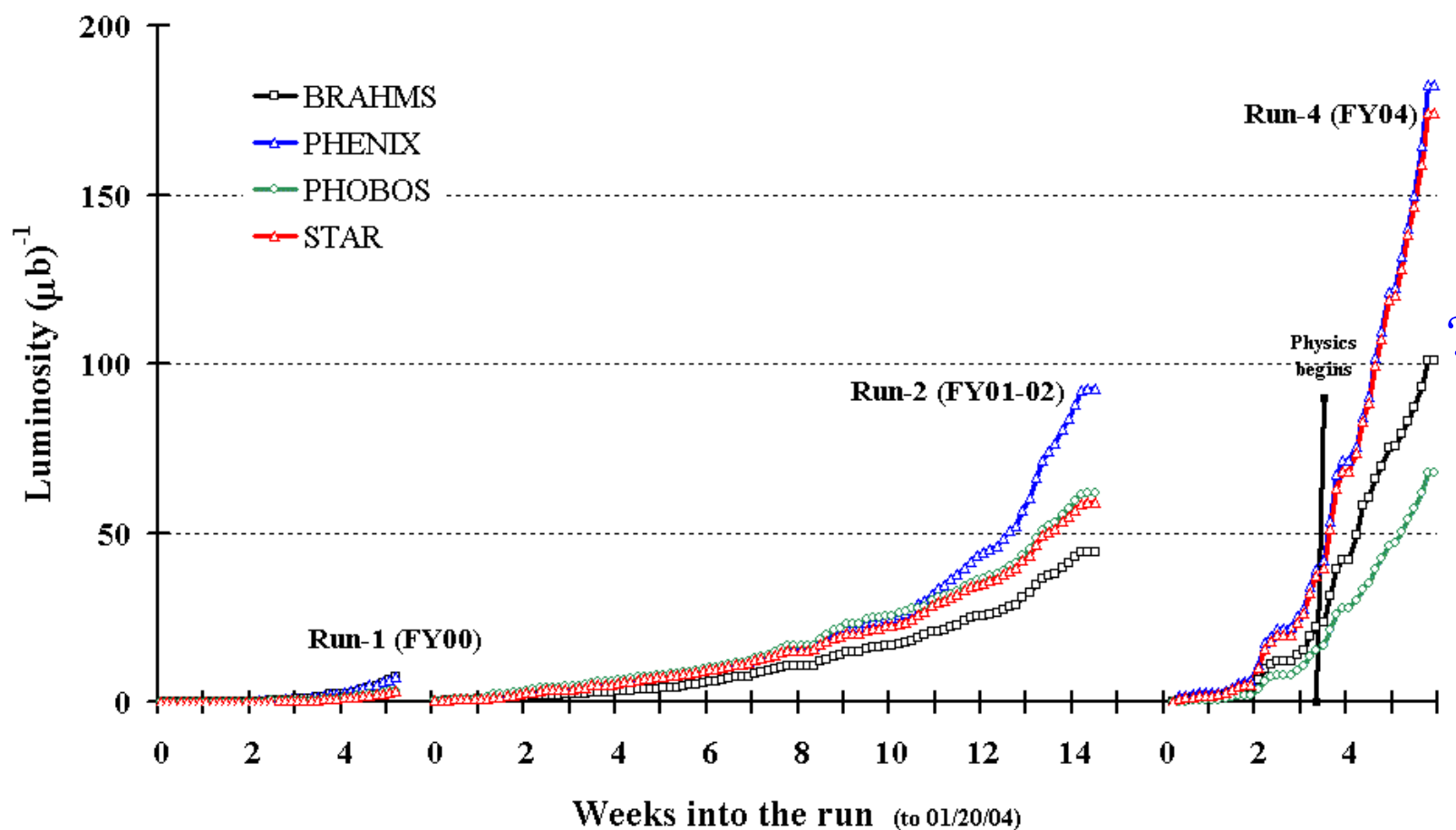
1. **Baking in Yellow IR4** (D. Weiss, L. Smart)
→ Raised Yellow intensity threshold from 0.7 to 0.8e9/bunch
2. **Smooth approach of store frequency** (T. Hayes, M. Brennan)
3. **Phase lock during frequency ramping** (T. Hayes, M. Brennan)
4. **Rf phase of all bunches in a AGS cycle** (T. Hayes, W. Fischer)
5. **New Prep and Up sequences** (J. van Zeijts, W. Fischer)
6. **Faster AGS cycle**, from 5.4 to 4.0sec (L. Ahrens, T. Shrey, K. Zeno)
7. **Automatic steering for all experiments**, sequentially (T. D'Ottavio)
8. **Continuous gap cleaning** (A. Drees)
9. **Faster collimation** (A. Drees)

Stores during last week, Monday to Monday



Delivered $182.5 (\mu\text{b})^{-1}$ to Phenix [109.8]
 $72.7 (\mu\text{b})^{-1}$ last week [42.4]
Target **330 $(\mu\text{b})^{-1}$**

Star $\times 0.9$
 Phobos $\times 0.3$
 Brahms $\times 0.5?$



Plan for next week:

1. Optimize bunch intensity and numbers [$\sim +10\%$ luminosity]
at vacuum limit, in Blue and Yellow
2. Better emittance control [$\sim +10\text{-}20\%$ luminosity]
3. Further refinements [$\sim +10\%$ luminosity]
 - Injection
 - Automatic orbit correction
 - Automatic steering (now $\sim 5\text{min}$)
 - Collimation (now $\sim 15\text{min}$)

[experiments should use own judgment for turn-on – no store lost during steering or collimation in last 3 weeks]

Further ideas:

- Very high intensity bunches ($>1.5e9$, Landau cavities, Booster merge)
- PHENIX $\beta^*=80\text{cm}$ (needs preparation)